JAN 8 2002

SUMMARY OF SAFETY AND EFFECTIVENESS

K013592

1. Device Name:

Magnetic Resonance Imaging Accessory

2. Proprietary Name:

Extremity Coil

3. Classification:

Class II

4. Establishment Registration #:

1529041

5. Manufacture Facility Location:

USA Instruments, Inc., 1515 Danner Drive,

Aurora, Ohio 44202, USA

Telephone: 330-562-1000; Fax: 330-562-1422.

6. Performance Standard:

No applicable performance standards have been

issued under Section 514 of the Food, Drug and

Cosmetic Act.

7. Intended Use:

The Extremity Coil is a specialty receive-only RF coil, used to obtain diagnostic images of the knee and foot anatomy in Magnetic Resonance Imaging systems. The indications for use are the same as for standard MR Imaging. The Extremity Coil is designed for use with the Rhapsody 1.0T MRI Scanners manufactured by Siemens Medical

Systems, Inc.

8. Device Description:

The Extremity Coil package consists of a knee coil (two sizes: small and large) and an attachable foot coil. The electrical circuitry is enclosed in a durable housing assembly made of polyurethane, fiberglass, and ABS/PVC plastic alloy, which are fire rated and have high impact and tensile strength. The Knee Coil is mechanically split into two halves for easier coil handling and more accurate positioning of the patient's knee in the coil. The foot Coil is contoured to accommodate the foot and is mechanically

attached to the knee coil.

9. Safety and Effectiveness

Extremity Coil Product Features	Comparison to predicate device or other 510(k) cleared product
Intended Use: Knee and Foot Imaging Applications	-Similar to the Legend 5000 Knee and Foot Coil manufactured by USA Instruments, Inc. (K994040) -Similar to the Leo 7000 Quadrature Knee coil manufactured by USA Instruments, Inc. (K971246)
Indications for Use Identical to routine MRI imaging	-Similar to the Legend 5000 Knee and Foot Coil manufactured by USA Instruments, Inc. (K994040) -Similar to the Leo 7000 Quadrature Knee coil manufactured by USA Instruments, Inc. (K971246)
Coil Material • Flame retardant Polyurethane ABS plastic alloy Fiberglass	-Similar to the Legend 5000 Knee and Foot Coil manufactured by USA Instruments, Inc. (K994040)
Coil Design Two channel receive only Phased Array Design	-Similar to the Legend 5000 Knee and Foot Coil manufactured by USA Instruments, Inc. (K994040)
Decoupling RF Chokes with Switching Diodes	-Similar to the Legend 5000 Knee and Foot Coil manufactured by USA Instruments, Inc. (K994040) -Similar to the Leo 7000 Quadrature Knee coil manufactured by USA Instruments, Inc. (K971246)
Prevention of RF Burns Does not transmit RF Power, Decoupling isolates the coil elements from RF fields during RF transmission, Coil elements and circuitry are enclosed in a non- conductive housing.	-Similar to the Legend 5000 Knee and Foot Coil manufactured by USA Instruments, Inc. (K994040) -Similar to the Leo 7000 Quadrature Knee coil manufactured by USA Instruments, Inc. (K971246)
Radio Frequency Absorption Coil is a receive only coil and does not transmit RF power	-Similar to the Legend 5000 Knee and Foot Coil manufactured by USA Instruments, Inc. (K994040) -Similar to the Leo 7000 Quadrature Knee coil manufactured by USA Instruments, Inc. (K971246)
Formation of Resonant Loops Decoupling isolates coil elements from RF fields during RF transmission, Length of cable and stiffness does not allow permit looping	-Similar to the Legend 5000 Knee and Foot Coil manufactured by USA Instruments, Inc. (K994040) -Similar to the Leo 7000 Quadrature Knee coil manufactured by USA Instruments, Inc. (K971246)



Food and Drug Administration 9200 Corporate Boulevard Rockville MD 20850

JAN 8 2002

Mr. Rony Thomas Vice President Marketing and Programs USA Instruments, Inc. 1515 Danner Drive AURORA OH 44202 Re: K013592

Trade/Device Name: Extremity Coil

MRI specially coil

Regulation Number: 21 CFR 892.1000

Regulation Name: Magnetic resonance diagnostic device

Regulatory Class: II Product Code: 90 MOS Dated: October 24, 2001 Received: October 30, 2001

Dear Mr. Thomas:

We have reviewed your Section 510(k) premarket notification of intent to market the device referenced above and have determined the device is substantially equivalent (for the indications for use stated in the enclosure) to legally marketed predicate devices marketed in interstate commerce prior to May 28, 1976, the enactment date of the Medical Device Amendments, or to devices that have been reclassified in accordance with the provisions of the Federal Food, Drug, and Cosmetic Act (Act) that do not require approval of a premarket approval application (PMA). You may, therefore, market the device, subject to the general controls provisions of the Act. The general controls provisions of the Act include requirements for annual registration, listing of devices, good manufacturing practice, labeling, and prohibitions against misbranding and adulteration.

If your device is classified (see above) into either class II (Special Controls) or class III (PMA), it may be subject to additional controls. Existing major regulations affecting your device can be found in the Code of Federal Regulations, Title 21, Parts 800 to 898. In addition, FDA may publish further announcements concerning your device in the Federal Register.

Please be advised that FDA's issuance of a substantial equivalence determination does not mean that FDA has made a determination that your device complies with other requirements of the Act or any Federal statutes and regulations administered by other Federal agencies. You must comply with all the Act's requirements, including, but not limited to: registration and listing (21 CFR Part 807); labeling (21 CFR Part 801); good manufacturing practice requirements as set forth in the quality systems (QS) regulation (21 CFR Part 820); and if applicable, the electronic product radiation control provisions (sections 531-542 of the Act); 21 CFR 1000-1050.

This letter will allow you to begin marketing your device as described in your 510(k) premarket notification. The FDA finding of substantial equivalence of your device to a legally marketed predicate device results in a classification for your device and thus, permits your device to proceed to the market.

If you desire specific advice for your device on our labeling regulation (21 CFR Part 801), please contact the Office of Compliance at one of the following numbers, based on the regulation number at the top of this letter:

8xx.1xxx	(301) 594-4591
876.2xxx, 3xxx, 4xxx, 5xxx	(301) 594-4616
884.2xxx, 3xxx, 4xxx, 5xxx, 6xxx	(301) 594-4616
892.2xxx, 3xxx, 4xxx, 5xxx	(301) 594-4654
Other	(301) 594-4692

Additionally, for questions on the promotion and advertising of your device, please contact the Office of Compliance at (301) 594-4639. Also, please note the regulation entitled, "Misbranding by reference to premarket notification" (21 CFR Part 807.97). Other general information on your responsibilities under the Act may be obtained from the Division of Small Manufacturers, International and Consumer Assistance at its toll-free number (800) 638-2041 or (301) 443-6597 or at its Internet address http://www.fda.gov/cdrh/dsma/dsmamain.html.

Sincerely yours,

Vancy C. Brogdon
Nancy C. Brogdon

Director, Division of Reproductive, Abdominal, and Radiological Devices

Office of Device Evaluation

Center for Devices and Radiological Health

Enclosure

510(k) Number (if known): Ko/ 3592

Device Name: Extremity Coil

Indications for Use: The Extremity Coil is a receive-only specialty RF coil, used for obtaining diagnostic images of the knee and foot in Magnetic Resonance Imaging systems. The Extremity Coil is designed for use with the Siemens Rhapsody 1.0Tesla MRI scanner manufactured by Siemens Medical Systems, Inc.

Anatomic Regions: Shoulder and surrounding regions. Nuclei Excited: Hydrogen

The indications for use are the same as for standard imaging:

The Siemens Rhapsody MRI system is indicated for use as an NMR device that produces images that: (1) correspond to the distribution of protons exhibiting NMR signal, (2) depend upon NMR parameters (proton density, spin lattice relaxation time T1, spin-spin relaxation time T2) and (3) display the soft tissue structure of the head and whole body. When interpreted by a trained physician, these images yield information that can be useful in the determination of a diagnosis.

(PLEASE DO NOT WRITE BELOW THIS LINE- CONTINUE ON ANOTHER PAGE IF NEEDED)

Concurrence of CDRH, Office of Device Evaluation (ODE)

Division Sign-Off)
Division of Reproductive, Abdon

and Radiological Device

Prescription Use _____ (Per 21 CFR 801.109)

(Optional Format 1-2-96)